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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/662,306	09/16/2003	Kiyoshi Tagami	392.1817	1771
21171	7590	07/13/2005	EXAMINER	
STAAS & HALSEY LLP SUITE 700 1201 NEW YORK AVENUE, N.W. WASHINGTON, DC 20005			PHAM, LEDA T	
			ART UNIT	PAPER NUMBER
			2834	

DATE MAILED: 07/13/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

AK

Office Action Summary

Application No.

10/662,306

Applicant(s)

TAGAMI ET AL.

Examiner

Leda T. Pham

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 27 April 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3 and 8 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-3 and 8 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 27 April 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

1. This office action is in respond to amendment filed on 4/27/05.
2. Claim 1 – 3, and 8 are presented for examination. Claims 4 – 7 are canceled.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1 –3, and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pallaro (U.S. 4,403,162) in view of Takashi (JP 54-132701).

Regarding to claims 1 and 8, Pallaro teaches an electric motor (figure 1) comprising:

a stator core (10) having slots (14);

coils (22, 24) arranged along the slots of said stator core to form coil edges projecting from ends of said stator core (10); and

insulation sheets (26) for insulating proximal portions of the coil edges, each of said insulation sheets (26) having a folding portion (28, folding around coils 22, 24) for folding one or more coils of the same phase (running winding phase, and starter winding phase) and inserting portions (32) inserted into the slot or slots (14) of said stator core. However, Pallaro does not teach the inserting portion (32) fixed by drawing distal ends (the two end of portion 30) from inside of said stator core.

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Takashi teaches an electric motor having insulation sheet (23) with inserting portions inserted into slots of stator core by drawing distal ends (321, in order to state the insulation sheet 23 in the slot of the stator core, the distal ends are pulled to the slots of the stator core) from inside of stator core to make formation of coil can be facilitated.

Thus, it would have been obvious to one having skill in the art at the time the invention was made to modify the Pallaro's insulation with inserting portion inserted into slot by drawing distal ends from inside of stator core as taught by Takashi. Doing so would make insulation to be sure, and improve the reliability of electric motor.

Regarding to claim 3, Pallaro teaches the electric motor wherein an interconnecting portion between the folding portion (28) and the insertion portions (32) of said insulation sheet has a reduced width to form a constricted portion (the connecting portion between 28 and 32, figure 3).

Regarding to claim 2, Pallaro teaches an electric motor (figure 1) comprising:

a stator core (10) having slots (14);

coils (22, 24) arranged along the slots (14) of said stator core (10) forming coil edges projecting from ends of said stator core (10); and

insulation sheets (28) for insulating proximal portions of the coil edges, each of said insulation sheet having a folding portion (28, folding around coils 22, 24) for folding one or more coils of the same phase (running winding phase, and starter winding phase) and two inserting portions (32) extending from the folding portion (28) so that respective distal ends (the two outward end of 30) are positioned away from a centerline of the folding portion,

wherein the coils of the same phase are folded by the folding portions of said insulation sheets, and the inserting portions are inserted into the slots of said stator core. However, Pallaro does not teach the inserting portion (32) fixed by drawing distal ends (the two end of portion 30) from inside of said stator core.

Takashi teaches an electric motor having insulation sheet (23) with inserting portions inserted into slots of stator core by drawing distal ends (321, in order to state the insulation sheet 23 in the slot of the stator core, the distal ends are pulled to the slots of the stator core) from inside of stator core to make formation of coil can be facilitated.

Thus, it would have been obvious to one having skill in the art at the time the invention was made to modify the Pallaro's insulation with inserting portion inserted into slot by drawing distal ends from inside of stator core as taught by Takashi. Doing so would make insulation to be sure, and improve the reliability of electric motor.

Response to Arguments

5. Applicant's arguments filed on 4/27/05 have been fully considered but they are not persuasive.

6. The arguments are not persuasive because Takashi teaches the insulation sheets (23) has inserting portions (231) inserted in the slot or slots of the stator core (21) to be fixed by drawing distal ends thereof (pulling the end of the leg 231 to the slot, which is pulling the end leg 231 from the top to the bottom of the slot inside the stator core, the distal end is understood as any end of a means that away from the center point of that means) from inside of the stator core. Furthermore, "drawing distal end thereof from inside of staid stator core" is functional claim

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language that electric motors have insulation inserting in the slot would be able to do it. Thus, if “distal ends” are one of the structures in the present invention, they have to recite the structure claim language to describe the invention fully (see MPEP § 2183).

7. In response to applicant’s argument that “one of ordinary skill would not have been led to combine the teachings of Pallaro and Takashi”, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Takashi teaches the insulation element of a stator core for electric motor which has the same field of electric motor as taught by Pallaro.

8. In response to applicant’s argument that the reason for combining comes only from the subject application and not from the prior art, examiner notes that the abstract of Takashi said that the purpose of making his electric motor “to make phase insulation to be sure, and improve the reliability by using band state insulator and a plurality number of insulators with legs, and making phase insulation on the coil end part.”

Conclusion

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO**

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MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

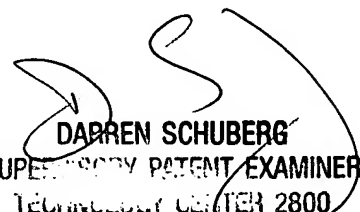
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leda T. Pham whose telephone number is (571) 272-2032. The examiner can normally be reached on M-F (8:30-6:00) first Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Darren Schuberg can be reached on (571) 272-2044. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Leda T. Pham
Examiner
Art Unit 2834

LTP
July 11, 2005


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